

REMARKS/ARGUMENTS

Reconsideration of this application and entry of this Amendment are solicited. Claims 18-24, 28-30, 33-36 and 38-53 will be pending in the application subsequent to entry of this Amendment.

The claims have been amended in order to more particularly point out and distinctly claim that which applicants regard as their invention and to address issues raised in item 1 of the Official Action.

Claims 37 and 54 are rejected as failing to comply with the Written Description requirement in item 1 of the Official Action. These two claims have been deleted in order to reduce issues.

It is proposed to amend claim 18 to specify that the strongly basic substance is either sodium hydroxide or a combination of sodium hydroxide and potassium hydroxide. Basis for this appears in the description of the invention and pending claim 23. As a consequence of this amendment it is proposed to amend claim 23 to direct it to the combination of sodium hydroxide and potassium hydroxide and consequential changes are made in the dependency of claim 24 and in the wording of claim 30. These amendments are presented in order to advance examination of this application and focus the claim on preferred aspects of the description. The amendments to the claims as discussed above resolve the anticipation rejection set out in item 2 of the Official Action. They also address the rejection in item 4 also based on the Sasagawa et al reference.

These amendments leave for consideration the rejection directed to claims 38-53 (54 has been canceled) as set out in item 5 of the Official Action which is based upon a combination of JP 11-9190 and Kawai et al.

JP11-9190 teaches, in the section [Prior Art], that "although it is possible to add an anti-oxidant in order to suppress such oxidation reaction of milk fat under warming conditions, there are few anti-oxidants that are highly safe and derived from a natural product, and, moreover do not affect the coffee taste. In addition, antioxidative activity could not be expected with adding a minute amount to the extent which does not affect the taste". JP11-9190 also teaches, in the section [Means for Solving the Problem], "the inventors focused on Maillard reaction products that would be expected to possess a strong antioxidative activity and not to affect the coffee taste, and then, by the means of adding such Maillard reaction products to a coffee extract

solution ..."

Namely, from the disclosure of JP11—9190, it would be expected that an amino acid added to a coffee extract solution is an amino acid that does not affect the flavor and taste of coffee to form Maillard reaction products, and that Maillard reaction products are intended to prevent thermal degradation and/or taste deterioration. In other words, the invention of JP11-9190 employs such components that do not affect the flavor and taste of coffee. To accomplish this it is necessary to select a particular type of amino acid. As to the particular type of amino acid, they list only neutral and aliphatic amino acids; as evidence of this they state that "glycine, alanine, leucine, isoleucine, valine and the like can be listed as the amino acids" in the section [0008]. From this passage it will be realized that they intend to use not any type of amino acids, but only neutral and aliphatic amino acids.

Further, in the case that an acid or basic amino acid is added to a coffee extract solution, it not only affects the coffee taste, but also changes the pH of the coffee to alter the coffee flavor. That is, the addition of the acid or basic amino acid cannot resolve their objective "to produce the subject beverage without any deterioration in flavor and taste", and to do so would be out of the scope of their invention. A person skilled in the art could not have reached the addition of the basic amino acid easily, and could not expect the precipitation suppression effect that the basic amino acid will bring as provided in the present application.

Furthermore, an article related to the Maillard reaction states that "although the rate of the reaction is dependent on (the) types of saccharides and amino acids involved, the rate generally will be increased more under higher pH and/or higher temperature conditions." The addition of the basic amino acid will change the pH of the coffee to affect the reaction rate that would alter the coffee taste. Namely in the case that a basic amino acid is employed, the problem of concern in JP11-9190 cannot be resolved without any other additional technique for regulation of the pH and/or the reaction rate. Even if the neutralization technique of Kawai et al is combined with JP11-9190, the precipitation suppression effect that the basic amino acid will bring as explained in the present application still could not be expected.

In conclusion, applicants submit that the simple selection of the basic amino acid in JP11-9190 would still not resolve their problem. In addition, even if JP11-9190 is combined with Kawai et al, the effect of the present invention would not be expected. Consequently, the

YOKOO et al
Appl. No. 10/021,434
October 12, 2006

invention of the subject claims is non-obvious over the two citations.

For the above reasons it is respectfully submitted that the claims of this application define inventive subject matter. Reconsideration, entry of this Amendment and allowance are solicited. Should the examiner has any questions, please contact the undersigned.

Respectfully submitted,

NIXON & VANDERHYE P.C.

By: _____



Arthur R. Crawford
Reg. No. 25,327

ARC:eaw
901 North Glebe Road, 11th Floor
Arlington, VA 22203-1808
Telephone: (703) 816-4000
Facsimile: (703) 816-4100